CLAIM AMENDEMENTS:

1-39. (cancelled)

40. (previously presented) An excimer laser comprising a chamber device, a gas mixture sealed in the chamber device, the gas mixture being composed of a rare gas selected from the group consisting of Kr and Ar, a buffer gas of Ne, and a halogen gas, gas supply means for supplying the mixture gas to the chamber device, and means for carrying out pulse oscillation in the chamber device by discharges across discharge electrodes to excite the gas mixture to oscillate a pulsed laser; wherein a predetermined amount of xenon gas having a concentration of approximately 10 ppm is supplied from xenon gas supply means to the gas mixture in the chamber device, whereby the chamber device operates to maximize an output energy of excimer laser and minimize a dispersion of the output energy.

41. (previously presented) An excimer laser comprising a chamber device, a gas mixture sealed in the chamber device, the gas mixture being composed of a rare gas selected from the group consisting of Kr and Ar, a buffer gas of Ne, and a halogen gas, gas supply means for supplying the mixture gas to the chamber device, and means for carrying out pulse oscillation by discharges across discharge electrodes to excite the gas mixture to oscillate a pulsed laser;

wherein an amount of xenon gas is supplied from the gas supply means and previously mixed in the gas mixture and sealed into the gas supply means, so that when the gas mixture is supplied into the chamber device, the gas mixture sealed within the chamber device has a xenon concentration of approximately 10 ppm, so that the xenon contained within the gas mixture maximizes an output energy of oscillated pulsed laser and minimizes a dispersion of the output energy of the oscillated pulsed laser.

42. (previously presented) An excimer laser output control method used in an excimer laser, which comprises:

a step of sealing a gas mixture within a chamber device, the gas mixture including a rare gas selected from the group consisting of Kr and Ar, a buffer gas of Ne, and a halogen gas by supplying the mixture gas from gas supply means;

a xenon gas supplying step of supplying a predetermined amount of xenon gas into the chamber device in which the gas mixture was sealed, so that the gas mixture sealed in the chamber device has a xenon concentration of approximately 10 ppm; and

a step of carrying out pulse oscillation in the chamber device by discharge across discharge electrodes to excite the gas mixture to oscillate pulsed laser, so that the xenon contained within the gas mixture maximizes an output energy of the oscillated pulsed laser and minimizes a dispersion of the output energy of the oscillated pulsed laser.

43. (previously presented) An excimer laser output control method according to claim 42 further comprising:

a step of sealing the xenon gas to be supplied to the chamber device to a xenon gas supply means; and

a concentration sensing step of detecting the concentration of xenon gas added to the gas mixture in the chamber device,

wherein during the xenon gas supplying step, a supply amount of the xenon gas sealed in the xenon gas supply means and supplied to the chamber device is controlled so that the concentration of the xenon gas detected in the concentration sensing step becomes approximately 10 ppm of the gas mixture.

44. (previously presented) An excimer laser output control method used in an excimer laser chamber device, which comprises:

a step of preparing a gas mixture composed of a rare earth gas selected from the group consisting of Kr and Ar, a buffer gas of Ne, and a halogen gas;

a xenon gas mixing step of supplying a predetermined amount of xenon gas into the gas mixture and mixing the predetermined amount of xenon gas with the gas mixture, so that the gas mixture contains approximately 10 ppm of xenon gas;

a supply step of supplying the gas mixture containing approximately 10 ppm of xenon gas to the chamber device;

a sealing step of sealing the gas mixture containing approximately 10 ppm of xenon gas in the chamber device; and

an oscillation step of carrying out pulse oscillation in the chamber device by discharge across discharge electrodes to excite the gas mixture, whereby the approximately 10 ppm of xenon gas in the gas mixture maximizes an output energy of oscillated pulsed laser and minimizes a dispersion of the output energy of the oscillated pulsed laser.

45. (previously presented) An excimer laser according to claim 40, wherein the gas supply means includes an xenon sensor means for detecting an amount of xenon within the chamber device, and a controller for controlling the amount of xenon supplied to the chamber device based on the detected amount of xenon in the chamber device by the xenon sensor means.

46. (previously presented) An excimer laser according to claim 41, wherein the gas supply means includes an xenon sensor means for detecting an amount of xenon within the chamber device, and a controller for controlling the amount of xenon supplied to the chamber device based on the detected amount of xenon in the chamber device by the xenon sensor means.

47. (previously presented) An excimer laser output control method according to claim 42, further includes a step of detecting an amount of xenon within the chamber device by xenon sensor means, and a step of supplying a

controlled amount of xenon to the chamber device based on the detected amount of xenon in the chamber device by the xenon sensor means.

48. (previously presented) An excimer laser output control method according to claim 44, further includes a step of detecting an amount of xenon within the chamber device by xenon sensor means, and a step of supplying a controlled amount of xenon to the chamber device based on the detected amount of xenon in the chamber device by the xenon sensor means.

49. (currently amended) An excimer laser ~~output control method~~ according to claim 40, wherein the rare gas is Kr.

50. (currently amended) An excimer laser ~~output control method~~ according to claim 41, wherein the rare gas is Kr.

51. (previously presented) An excimer laser output control method according to claim 42, wherein the rare gas is Kr.

52. (previously presented) An excimer laser output control method according to claim 44, wherein the rare gas is Kr.